

THREE NON-NATIVE VASCULAR PLANT SPECIES NEW TO ALABAMA

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ABSTRACT

Allium neapolitanum (Amaryllidaceae), *Arachis glabrata* (Fabaceae), and *Ornithogalum nutans* (Hyacinthaceae) are reported new for Alabama from recent collections.

KEY WORDS: Alabama, non-native, *Allium neapolitanum*, *Arachis glabrata*, *Ornithogalum nutans*

Continued botanical explorations in Alabama have yielded three recent collections of exotic species by the author that are deemed noteworthy. In reviewing pertinent literature, including the recently published checklist of vascular plants for Alabama, as well as web based resources, including the Alabama Plant Atlas (Kral et al. 2012), it is believed that these collections represent the first vouchers from Alabama for each of the three species (Mohr 1901; Kral et al. 2011; Kral et al. 2012; USDA, NRCS 2012).

ALLIUM NEAPOLITANUM Cirillo (Amaryllidaceae) — is a native of the Mediterranean region of southern Europe, where it frequents pastures and cultivated grounds as well as dry open places (Stearn 1980). The naturalized occurrences in North America have been attributed to garden escapes (McNeal & Jacobsen 2002). Before this current report, the species had been documented as naturalized in California, Florida, Georgia, and Louisiana (USDA, NRCS 2012). The addition of Alabama seems to continue a trend of the occurrence in states with warmer climates. From this, discoveries of other naturalized populations may continue to be made in other southern states.

The population vouchered below was growing in a vacant disturbed lot in an older part of town. About 25 individuals in three stands were observed at this locality, but it is unclear how many of these were the result of clonal divisions in the substrate. In addition to the vouchered collection, the species was also observed growing naturalized at two additional localities in the same town on the same day the voucher was collected.

Voucher specimens: Alabama. Marengo Co.: Demopolis, area just SW of jct. between E Franklin St. and S Strawberry Ave., 32.51575°, -87.83685°, 24 Feb 2012, Keener 6855 (UWAL, duplicates TROY, VDB).

ARACHIS GLABRATA Bentham (Fabaceae) — is a native of southern Brazil, Paraguay, and extreme northeastern Argentina (Krapovikas & Gregory 2007). It has been introduced into the USA, particularly Florida, where it has been used as a forage plant (Krapovikas & Gregory 2007). Since its introduction into Florida, it has been documented as naturalized at several localities along roadsides and adjacent fields (Isely 1998).

In fairly recent time, there has been a bit of taxonomic discrepancy regarding the naturalized material of *Arachis* in Florida. This may be partly due to Wunderlin and Hansen (2003), who treated the naturalized material as *A. prostrata*, noting that *A. glabrata* had been previously "misapplied". However, in a more recent revision of their publication, Wunderlin and Hansen (2011) have changed the taxon to *Arachis glabrata*, which also matches their treatment for the species found in the Atlas of

Florida Vascular Plants (2012). This also seems to be congruent with the generic monograph work of Krapovikas and Gregory (2007). However, the USDA PLANTS database (USDA, NRCS 2012) maintains that *A. prostrata* is the commonly escaped *Arachis* in Florida, while *A. glabrata* is "excluded" from the USA flora.

The population vouchered below was found along a rural roadside and adjacent moist roadside ditch. It was growing with *Xyris* sp. and several species of *Carex* and *Rhynchospora*. It was also observed in a nearby field, where an interview with the landowner revealed that he had planted "Perennial Peanut" in his field "years ago" and that it is surviving without aid other than grazing. The vouchered plants were collected some distance away from his field, well away from the cultivated area. From this it was clear that the species is spreading from cultivation.

Voucher specimens: **Alabama**. Baldwin Co.: 6.1 air mi. SW of Seminole, along Co. Rd. 91 (Gardner Rd.) ca. 0.4 mi. W of Le Frank Rd., 30.46570°, -87.50154°, 3 Jul 2011, *Keener 6596* (UWAL, duplicates TROY, VDB).

ORNITHOGALUM NUTANS Linnaeus (Hyacinthaceae) — is native to the southeastern portion of the Balkan Peninsula, including Greece, Bulgaria, and Turkey (Zahariadi 1980). Often grown as a garden flower, it has become widely naturalized as an escape from cultivation in Europe and other parts of the world including North America (Zahariadi 1980; Straley & Utech 2002). In the USA, it has specifically been documented from several northeastern and midwestern states, reaching south to Arkansas and North Carolina. It has also been documented in northwestern states such as Oregon and Washington (Straley & Utech 2002; USDA, NRCS 2012).

The population vouchered below was found in an approximately 0.5 acre row-crop garden area. The population contained about 30 plants growing among many other early spring exotic weeds often seen in similar fallow situations. The plants were randomly distributed throughout the plot with no evidence of persistence from cultivation.

Voucher specimens: **Alabama**. Greene Co.: 0.6 air mi. E of Eutaw, along US Hwy 11 (Tuscaloosa St.) just W of jct with 4th Ave., 32.84050°, -87.88132°, 6 Mar 2012, *Keener 6886* (UWAL, duplicates TROY, VDB).

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LITERATURE CITED

- Isely, D. 1998. Native and Naturalized Leguminosae (Fabaceae) of the United States (Exclusive of Alaska and Hawaii). Monte L. Bean Life Science Museum, Brigham Young Univ., Provo, Utah.
- Kral R., A.R. Diamond Jr., S.L. Ginzburg, C.J. Hansen, R.R. Haynes, B.R. Keener, M.G. Lelong, D.D. Spaulding and M. Woods. 2011. Annotated Checklist of the Vascular Plants of Alabama. Botanical Res. Inst. of Texas, Fort Worth.
- Kral, R., A.R. Diamond Jr., S.L. Ginzburg, C.J. Hansen, R.R. Haynes, B.R. Keener, M.G. Lelong, D.D. Spaulding, and M. Woods. 2012. Alabama Plant Atlas. [S.M. Landry and K.N. Campbell (original application development), Florida Center for Community Design and Research. Univ. of South Florida]. Univ. of West Alabama, Livingston.
<<http://www.floraofalabama.org/>>
- Krapovikas, A. and W.C. Gregory. 2007. Taxonomy of the genus *Arachis* (Leguminosae). *Bonplandia* 16 (Supl.): 1–205. [Translated by D.E. Williams and C.E. Simpson].

- Mohr, C.T. 1901. Plant life of Alabama: An account of the distribution, modes of association, and adaptations of the flora of Alabama, together with a systematic catalogue of the plants growing in the state. *Contr. U.S. Natl. Herb.* 6.
- Stearn, W.T. 1980. *Allium*. Pp 49–69 in T.G. Tutin, V.H. Heywood, N.A. Burges, D.M. Moore, D.H. Valentine, S.M. Walters, and D.A. Webb. *Flora Europaea*. Volume 5. Cambridge Univ. Press, Cambridge, United Kingdom.
- Straley, G.B. and F.H. Utech. 2002. *Ornithogalum*. Pp. 318–319 in Flora of North America Editorial Committee. *Flora of North America*, Vol. 26, Magnoliophyta: Liliidae: Liliales and Orchidales.
- USDA, NRCS. 2012. The PLANTS Database. National Plant Data Team, Greensboro, North Carolina. <<http://plants.usda.gov>> Accessed February 2012.
- Wunderlin, R.P., and B.F. Hansen. 2003. *Guide to the Vascular Plants of Florida* (ed. 2). Univ. Press of Florida, Gainesville.
- Wunderlin, R.P., and B.F. Hansen. 2011. *Guide to the Vascular Plants of Florida* (ed. 3). Univ. Press of Florida, Gainesville.
- Wunderlin, R.P. and B.F. Hansen. 2012. *Atlas of Florida Vascular Plants*. [S.M. Landry and K.N. Campbell (application development), Florida Center for Community Design and Research] Inst. for Systematic Botany, Univ. of South Florida, Tampa. <<http://www.plantatlas.usf.edu/>>
- Zahariadi, C. 1980. *Ornithogalum*. Pp. 35–40 in T.G. Tutin, V.H. Heywood, N.A. Burges, D.M. Moore, D.H. Valentine, S.M. Walters, and D.A. Webb. *Flora Europaea*. Volume 5. Cambridge Univ. Press, Cambridge, United Kingdom.
- Wunderlin, R.P. and B.F. Hansen. 2012. *Atlas of Florida Vascular Plants*. [S.M. Landry and K.N. Campbell (application development), Florida Center for Community Design and Research] Inst. for Systematic Botany, Univ. of South Florida, Tampa. <<http://www.plantatlas.usf.edu/>>